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State of Idaho Department of Environmental Quality

Disclaimer: This publication has been developed as part of an informational service for the source water assessments of public water systems in Idaho and is based on data available at the time and the professional judgement of the staff. Although reasonable efforts have been made to present accurate information, no guarantees, including expressed or implied warranties of any kind, are made with respect to this publication by the State of Idaho or any of its agencies, employees, or agents, who also assume no legal responsibility for the accuracy of presentations, comments, or other information in this publication. The assessment is subject to modification if new data is produced.

Executive Summary

Under the Safe Drinking Water Act Amendments of 1996, all states are required by the U.S. Environmental Protection Agency to assess every source of public drinking water for its relative sensitivity to contaminants regulated by the Act. This assessment is based on a land use inventory of the designated assessment area and sensitivity factors associated with the watershed characteristics.

This report, *Source Water Assessment for the City of Weiser, Idaho*, describes the public drinking water system, the zone boundary of water contribution, and the associated potential contaminant sources located within this boundary. This assessment should be used as a planning tool, taking local knowledge and concerns into account, to develop and implement appropriate protection measures for this source. **The results should not be used as an absolute measure of risk and they should not be used to undermine public confidence in the water system.**

The City of Weiser drinking water system consists of two surface water intake structures, one in the Weiser River, and one in the Snake River, both southeast of town (Figure 1). The Snake River intake system is ranked high in susceptibility to contamination overall due to a large number of potential contaminant sources and due to the land use within the delineated area. The land use is predominantly irrigated agriculture and is within priority of concern areas for nitrates, inorganic and organic chemical useage. The Weiser River intake system on the other hand is ranked moderate in susceptibility to contamination, with the land use being predominantly being represented by irrigated agriculture, commercial and industrial.

This assessment should be used as a basis for determining appropriate new protection measures or re-evaluating existing protection efforts. No matter what ranking a source receives, protection is always important. Whether the source is currently located in a "pristine" area or an area with numerous industrial and/or agricultural land uses, the way to ensure good water quality in the future is to act now to protect valuable water supply resources.

Due to the fairly short time associated with the movement of surface waters, source water protection activities should be aimed at short-term management strategies with the development of long-term management strategies to counter any future contamination threats. Source water protection activities should be coordinated with the Cities of Ontario, Oregon, Fruitland, Payette, Midvale, Cambridge, the Soil Conservation Commission, the Natural Resources Conservation Service, the Idaho Department of Lands, the Idaho Department of Agriculture, the U.S. Bureau of Reclamation, the U.S. Forest Service and other agencies with jurisdiction within the source water area.

A community with a fully developed source water protection program will incorporate many strategies. For assistance in developing protection strategies please contact your regional IDEQ office or the Idaho Rural Water Association.

SOURCE WATER ASSESSMENT FOR THE CITY OF WEISER

Section 1. Introduction - Basis for Assessment

The following sections contain information necessary to understand how and why this assessment was conducted. It is important to review this information to understand what the ranking of this source means. A map showing the delineated source water assessment area, a map showing the entire watershed contributing to the delineated area, a map showing the twenty-four (24) hour emergency response delineation, and the inventory of significant potential sources of contamination identified within the delineated area are attached. The list of significant potential contaminant source categories and their rankings used to develop the assessment also is attached.

Background

Under the Safe Drinking Water Act Amendments of 1996, all states are required by the U.S. Environmental Protection Agency (EPA) to assess every source of public drinking water for its relative susceptibility to contaminants regulated by the Safe Drinking Water Act. This assessment is based on a land use inventory of the delineated assessment area and sensitivity factors associated with the intakes and watershed characteristics.

Level of Accuracy and Purpose of the Assessment

Over 2,900 public water sources in Idaho must be assessed by May of 2003. An in-depth, site-specific investigation of each significant potential source of contamination is not possible. Therefore, this assessment should be used as a planning tool, taken into account with local knowledge and concerns, to develop and implement appropriate protection measures for this source. The results should <u>not be</u> used as an absolute measure of risk and they should <u>not be</u> used to undermine public confidence in the water system.

The ultimate goal of the assessment is to provide data to local communities to develop a protection strategy for their drinking water supply system. The Idaho Department of Environmental Quality (IDEQ) recognizes that pollution prevention activities generally require less time and money to implement than treatment of a public water supply system once it has been contaminated. IDEQ encourages communities to balance resource protection with economic growth and development. The decision as to the amount and types of information necessary to develop a source water protection program should be determined by the local community based on its own needs and limitations. Source water protection is one facet of a comprehensive growth plan, and it can complement ongoing local planning efforts.

FIGURE 1. Geographic Location & Topographic Watershed Delineation for the City of Weiser STATE OF IDAHO CONTROL WENE 150 200 Miles WEISER: SNAKE RIVER INTAKE & WEISER RIVER INTAKE WATERSHED FUDEO 33 Fastside 1 Sen SNAKE RIVER INTAKE WEISER RIVER INTAKE 28 Weiser River Snake River Racia Tower KWE. 5

Section 2. Conducting the Assessment

General Description of the Source Water Quality

Weiser, Idaho is a community of approximately 5,262 people, located at the confluence of the Weiser and Snake Rivers near the Oregon border, approximately 70 miles Northwest of Boise (Figure 1). The public drinking water system for the City of Weiser is comprised of two drinking water intakes within both the Weiser and Snake Rivers. The City of Weiser also derives water from 10 ground water sources that will be assessed at a later date.

Water quality issues currently facing the City of Weiser is the amount and varied types of possible contaminant sources within the delineated source water area. Another issue facing the system, and that of most surface water systems are possible bacterial (microbial) contamination and the problems associated with managing it. Surface water systems in general are vulnerable to bacterial contamination.

Defining the Zones of Contribution--Delineation

To protect surface water systems from such potential contaminant pathways, the EPA required that the entire drainage basin be delineated upstream from the intake to the hydrologic boundary of the drainage basin (U.S. EPA, 1997b). The EPA recognized that an intake on a large water body could have an extensive drainage basin. Therefore, the EPA recommended that large drainage basins be segmented into smaller areas for the purpose of implementing a cost-effective potential contaminant inventory and susceptibility analysis. The delineation process established the physical area around an intake that became the focal point of the assessment. This process included mapping the boundaries of the zone of contribution into a river buffer zone that extends from the intake upstream 25 miles or to the 4-hour streamflow time-of-travel boundary, whichever is greater. This buffer zone also extends up tributaries to the remainder of the 25-mile boundary or the 4-hour time-of-travel boundary. This time-of-travel boundary is based on gauge station information based on a 10-year flood event.

The delineated source water assessment area for the City of Weiser (Figure 2) can best be described as a buffered area, 500 feet on either side of the both the Snake and Weiser Rivers that extends upstream 25 miles and includes stream reaches and tributaries. The delineation for the Snake River segment extends upstream to beyond Fruitland and for the Weiser River segment the delineation extends east to near Crane Creek Reservoir and north into the Mann Creek drainage. The total delineated area for both drainage's consists of approximately 47,818 acres. The actual data used by IDEQ in determining the source water assessment delineation are available upon request.

A delineation of the watershed and stream segments encompassed by a twenty-four hour time of travel, based on annual discharge rates was produced to provide system operators with a map for emergency response purposes. This map would allow the operators to be aware of the roads, railroads, and major sources of contamination that are located close to the stream network in case of a major spill which could impact their drinking water system intake. Stream velocity for time of travel estimates was calculated using the mean annual daily discharge. A 500-foot buffer on either side of major stream segments was used to identify major sources of contamination such as above ground storage tanks, NPDES discharge sites, and RCRA facilities.

The 24-hour emergency response delineation for the City of Weiser is illustrated on two maps. The 24-hour emergency response delineation for the Snake River intake is illustrated on Figure 3 and on Figure 4 for the Weiser River intake.

Identifying Potential Sources of Contamination

A potential source of contamination is defined as any facility or activity that stores, uses, or produces, as a product or by-product, the contaminants regulated under the Safe Drinking Water Act and that could pose a concern relative to drinking water sources. The goal of the inventory process is to locate and describe those facilities, land uses, and environmental conditions that are potential sources of surface water contamination. The locations of potential sources of contamination within the delineation areas were obtained by field surveys conducted by IDEQ and from available databases.

Land use within the City of Weiser source water delineated area for the Snake River intake consists predominantly of agriculture, with smaller amounts of forest, range, urban and suburban land. Land use within the City of Weiser source water delineated area for the Weiser River consists of predominately rangeland with smaller amounts of irrigated agriculture and suburban areas. Rural residential homes, suburban and urban subdivisions, small businesses, light manufacturing and recreational sites are scattered within the delineated area. Homes and businesses within the source water delineated area operate with both sewer systems in urban areas and with individual septic systems in the more rural areas.

It is important to understand that a release may never occur from a potential source of contamination provided best management practices are being used. Many potential sources of contamination are regulated at the federal level, state level, or a combination of levels to reduce the risk of release. Therefore, when a business, facility, or property is identified as a potential contaminant source, this should not be interpreted to mean that this business, facility, or property is in violation of any local, state, or federal environmental law or regulation. What it does mean is that the <u>potential</u> for contamination exists due to the nature of the business, industry, or operation. There are a number of methods that water systems can use to work cooperatively with potential sources of contamination. These involve educational visits and inspections of stored materials. Many owners of such facilities may not even be aware that they are located near a public water supply intake.

Contaminant Source Inventory Process

A two-phased contaminant inventory of the study area was conducted during October of 2000. The first phase involved identifying and documenting potential contaminant sources within the City of Weiser Source Water Assessment Area through the use of computer databases and Geographic Information System (GIS) maps developed by IDEQ. The second or enhanced phase of the contaminant inventory involved conducting an on-the-ground identification of potential sources and validation of sources identified in phase one. This task was undertaken with the assistance of the Mr. Joe Qualls and Mr. Rod Millbrook with the City of Weiser Water Department.

A total of 73 potential contaminant sources are located within the delineated source water area (see Table 1). The enhanced inventory included several other potential contaminant sources outside the delineated buffer zone area and are listed in the separately in Table 2. Since some of these sites fall outside the delineated area, they are labeled in a different color on Figure 2. A majority of the potential contaminant sources within delineated source water areas are located clustered in urban/suburban areas near Fruitland, Payette, and Weiser. Potential contaminant sources located in the delineated source water areas of the City of Weiser include businesses such as fuel stations, dairy, automotive, taxidermy, medical, contracting, storage, food processing, a cemetery, quarry/mines, waste water treatment, and water treatment discharge. (Figure 2).

Contaminants of concern are primarily related to volatile and synthetic organic contaminants, inorganic contaminants and microbial bacteria which may be related to the potential contaminant sources associated to the varied land use within the delineated source water area. Table 1 lists the potential contaminants of concern and information source. It should be noted that several of the LUST (leaking underground storage tank) sites have an incomplete cleanup listing and several UST (underground storage tank) sites are closed. It should also be noted that some sites that are listed as a mine in the database search may actually be a prospect or occurrence of a commodity that may include gravel or ornamental stone quarry in which no chemical extraction processes are involved.

 Table 1. City of Weiser Potential Contaminant Inventory

SITE#	SOURCE DESCRIPTION	SOURCE OF INFORMATION	POTENTIAL CONTAMINANT
1	LUST SITE	DATABASE SEARCH	VOC, SOC
2	LUST SITE	DATABASE SEARCH	VOC, SOC
3	UST SITE	DATABASE SEARCH	VOC, SOC
4	UST SITE	DATABASE SEARCH	VOC, SOC
5	UST SITE	DATABASE SEARCH	VOC, SOC
6	UST SITE	DATABASE SEARCH	VOC, SOC
7	UST SITE	DATABASE SEARCH	VOC, SOC
8	UST SITE	DATABASE SEARCH	VOC, SOC
9	DAIRY	DATABASE SEARCH	IOC, M
10	AUTOMOTIVE	DATABASE SEARCH	VOC, SOC
11	AUTOMOTIVE, AG CHEMICAL	DATABASE/ENHANCED	VOC, SOC, IOC
12	RV PARK	DATABASE SEARCH	VOC, SOC, M
13	TAXIDERMY	DATABASE SEARCH	IOC, SOC, M
14	HOSPITAL	DATABASE SEARCH	IOC, SOC, M
15	TAXIDERMY	DATABASE SEARCH	IOC, SOC, M
16	FORESTRY	DATABASE SEARCH	IOC, VOC, SOC
17	TRUCKING	DATABASE SEARCH	VOC, SOC
18	CONTRACTOR	DATABASE SEARCH	VOC, SOC, IOC
19	CONTRACTOR	DATABASE SEARCH	VOC, SOC, IOC
20	CONTRACTOR	DATABASE SEARCH	VOC, SOC, IOC
21	AUTOMOTIVE	DATABASE SEARCH	VOC, SOC
22	STORAGE	DATABASE SEARCH	VOC, SOC, IOC
23	TRUCKING	DATABASE SEARCH	VOC, SOC, IOC
24	REFUSE	DATABASE SEARCH	VOC, SOC, IOC, M
25	MOBILE/RV PARK	DATABASE SEARCH	VOC, SOC, M
26	CONTRACTOR	DATABASE SEARCH	VOC, SOC, IOC
27	PARKING MAINTENANCE	DATABASE SEARCH	VOC, SOC, IOC
28	CEMETERY	DATABASE SEARCH	IOC, M
29	TRUCKING	DATABASE SEARCH	VOC, SOC, IOC
30	NPDES SITE, FOOD PROCESSING	DATABASE SEARCH	IOC, SOC
31	NPDES SITE, WATER TREATMENT	DATABASE SEARCH	IOC, SOC
32	NPDES SITE, WATER TREATMENT	DATABASE SEARCH	IOC, SOC
33	NPDES SITE, WATER TREATMENT	DATABASE SEARCH	IOC, SOC
34	NPDES SITE, FOOD PROCESSING	DATABASE SEARCH	IOC, SOC
35	CERCLA SITE, RAIL, AG	DATABASE SEARCH	VOC, SOC, IOC
36	RCRIS SITE, AG	DATABASE SEARCH	VOC, SOC, IOC
37	RCRIS SITE, DRUG LAB	DATABASE SEARCH	VOC, SOC, IOC, M
38	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC
39	MINE/STONE	DATABASE SEARCH	IOC, VOC, SOC
40	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC
41	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC
42	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC
43	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC

SITE#	SOURCE DESCRIPTION	SOURCE OF INFORMATION	POTENTIAL CONTAMINANT
44	MINE/PROSPECT	DATABASE SEARCH	IOC, SOC, VOC
45	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
46	MINE/CLAY	DATABASE SEARCH	IOC, SOC, VOC
47	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC
48	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
49	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
50	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
51	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
52	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
53	MINE/PROSPECT	DATABASE SEARCH	IOC, VOC, SOC
54	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
55	MINE/SILICA	DATABASE SEARCH	IOC, VOC, SOC
56	MINE/GRAVEL	DATABASE SEARCH	IOC, VOC, SOC
57	MINE/GRAVEL	DATABASE SEARCH	IOC, VOC, SOC
58	MINE/GRAVEL	DATABASE SEARCH	IOC, VOC, SOC
59	MINE/GEOTHERMAL	DATABASE SEARCH	IOC
60	MINE/GRAVEL	DATABASE SEARCH	IOC, VOC, SOC
61	SARA/AG. CHEMICALS	DATABASE SEARCH	IOC, VOC, SOC
62	SARA	DATABASE SEARCH	IOC, VOC, SOC
63	SARA	DATABASE SEARCH	IOC, VOC, SOC
64	GROUP1	DATABASE SEARCH	IOC, SOC
65	WLAP SITE, FOOD PROCESSING	DATABASE SEARCH	IOC, SOC
66	FOOD PROCESSING	ENHANCED INVENTORY	IOC, SOC
67	AUTOMOTIVE	ENHANCED INVENTORY	IOC, VOC, SOC
68	AUTOMOTIVE	ENHANCED INVENTORY	IOC, VOC, SOC
69	CONFINED ANIMAL FEEDING	ENHANCED INVENTORY	M, IOC
70	RECYCLING	ENHANCED INVENTORY	IOC, SOC, VOC
71	AUTO SALVAGE	ENHANCED INVENTORY	IOC, VOC, SOC
72	AUTOMOTIVE	ENHANCED INVENTORY	VOC, SOC, IOC
73	MEAT PROCESSORS	ENHANCED INVENTORY	M, IOC

IOC = inorganic chemical, VOC = volatile organic chemical, SOC = synthetic organic chemical, M =microbial

Table 2. City of Weiser Potential Contaminant Inventory Outside 500' Buffer Delineation

SITE#	SOURCE DESCRIPTION	SOURCE OF INFORMATION	POTENTIAL CONTAMINANT
P-1	CONFINED ANIMAL	ENHANCED INVENTORY	IOC, M
P-2	CONFINED ANIMAL	ENHANCED INVENTORY	IOC, M
P-3	CONFINED ANIMAL	ENHANCED INVENTORY	IOC, M
P-4	CONFINED ANIMAL	ENHANCED INVENTORY	IOC, M
P-5	DAIRY	ENHANCED INVENTORY	IOC, M
P-6	DAIRY	ENHANCED INVENTORY	IOC, M
P-7	AG AIR SPRAYING	ENHANCED INVENTORY	VOC, SOC, IOC
P-8	AUTOMOTIVE	ENHANCED INVENTORY	VOC, SOC
H-1	MINE	ENHANCED INVENTORY	VOC, SOC, IOC

IOC = inorganic chemical, VOC = volatile organic chemical, SOC = synthetic organic chemical, M =microbial

Susceptibility Analyses

Significant potential sources of contamination were ranked as high, moderate, or low risk according to the following considerations: hydrologic characteristics, physical integrity and construction of the intake, land use characteristics, and potentially significant contaminant sources. The susceptibility rankings are specific to a particular potential contaminant or category of contaminants. Therefore, a high susceptibility rating relative to one potential contaminant does not mean that the water system is at the same risk for all other potential contaminants. The relative ranking that is derived for each intake is a qualitative, screening-level step that, in many cases, uses generalized assumptions and best professional judgement. The following summaries describe the rationale for the susceptibility ranking.

Intake Construction

The construction of a public water system's intake directly affects the ability of the intake to protect the source from contaminants. The City of Weiser water system consists of two intake systems that produce surface water for domestic and industrial uses. One intake is located on the Snake River and the other is located on the Weiser River. Both intakes directly draw water from the river and then feed into a cistern. The intakes consist of cement boxes with screens that were constructed in the early 1970's. The screens are cleaned and repaired on a yearly basis. Both intakes scored moderate in susceptibility for system construction.

Potential Contaminant Source and Land Use

The Snake River intake system for the City of Weiser rated in the high susceptibility category for the inorganic, volatile organic, and synthetic organic chemical classes and microbial bacteria (Table 3). This is due to the number and variety of potential contaminant sources and the predominant irrigated agriculture land use within this delineated area. The delineated area for this intake also includes several urban areas including Fruitland and Payette.

The Weiser River intake system for the City of Weiser rated in the moderate susceptibility category for the inorganic, volatile organic, and synthetic organic chemical classes and microbial bacteria (Table 3). This is due to the number and variety of potential contaminant sources and the predominance of irrigated agricultural, commercial, and industrial land use within this delineated area.

Table 3. Summary of City of Weiser Susceptibility Evaluation

	Contaminant Inventory				System	Final Susceptibility Ranking			Ranking
Contaminant ¹	IOC VOC SOC Microbial		Construction	IOC	VOC	SOC	Microbial		
Susceptibility									
Ranking ²									
Snake River	Н	Н	Н	Н	M	Н	Н	Н	Н
Weiser River	M	M	M	M	M	M	M	M	M

¹IOC = inorganic chemical, VOC = volatile organic chemical, SOC = synthetic organic chemical

Susceptibility Summary

The City of Weiser water system is highly susceptible to contamination in all chemical classes for the Snake River intake due to the land use and large amount of potential contaminant sources within the delineated area for the Snake River intake. On the other hand, the water system is moderately susceptible to all chemical classes for the Weiser River intake, due in part to land use. The system has a moderate susceptibility in terms of intake construction for both intakes. The system is also subject to turbidity due to activities that occur along the stream banks.

In the chemical monitoring history for the system, there have been detections of volatile organic, synthetic organic and inorganic class chemicals; however, none have exceeded maximum contaminant levels. In 1998, there were detections of total coliform (microbial bacteria) that exceeded the maximum contaminant levels. The detection appears to have been an isolated incident and repeat samples were negative. Surface water systems in general are vulnerable to microbial bacteria contamination and treatment is extremely important.

Total coliform bacteria are generally considered to be an indicator of pathonogenic ground water contamination. Although total coliform bacteria itself does not represent a public health concern, other bacteria and viruses associated with it may represent serious health concerns. Total coliform bacteria are often associated with surface activities. Potential sources of bacteria contamination can include subsurface sewage disposal systems (septic tanks and drain fields), contaminated surface water and confined animal rearing areas.

Surface water systems in general are also vulnerable to a large variety of other contaminant sources. Transportation corridors often parallel major rivers and the potential of an accidental spill is always a concern.

 $^{^{2}}H = \text{high susceptibility}, M = \text{moderate susceptibility}, L = \text{low susceptibility}$

³H* Indicates source automatically scored as high susceptibility due to the presence a contaminant in the finished drinking water.

Section 3 Options for Source Water Protection

The susceptibility assessment should be used as a basis for determining appropriate new protection measures or re-evaluating existing protection efforts. No matter what the susceptibility ranking a source receives, protection is always important. Whether the source is currently located in a "pristine" area or an area with numerous industrial and/or agricultural land uses that require education and surveillance, the way to ensure good water quality in the future is to act now to protect valuable water supply resources.

An effective source water protection program is tailored to the particular local source water protection area. A community with a fully developed source water protection program will incorporate many strategies. For the City of Weiser, source water protection activities should focus on environmental education with the community, recreational users and businesses that operate within the vicinity of the delineation. Most of the delineated areas are outside the direct jurisdiction of the City of Weiser. The Idaho Source Water Assessment stops at the state border. The City of Weiser is concerned with the impacts of an operation in Oregon. Partnerships with neighboring communities with adjacent states should be explored in source water protection. Due to the relatively short time involved with the movement of surface water, source water protection activities should be aimed at short-term management strategies with an emphasis on dealing with long-term future impacts from these same sources. Source water protection activities should be coordinated with the Cities of Ontario, Oregon, Fruitland, Payette, Midvale, Cambridge, the Soil Conservation Commission, the Natural Resources Conservation Service, the Idaho Department of Lands, the Idaho Department of Agriculture, the U.S. Bureau of Reclamation, the U.S. Forest Service, irrigation districts and other agencies. It is also suggested that the community coordinate with the Idaho State Police, Union Pacific Railroad and the Bureau of Disaster Services to improve communications in the event of an accidental spill along a transportation corridor.

Assistance

Public water supplies and others may call the following IDEQ offices with questions about this assessment and to request assistance with developing and implementing a local protection plan. In addition, draft protection plans may be submitted to the IDEQ office for preliminary review and comments.

Boise Regional IDEQ Office (208) 373-0550

State IDEQ Office (208) 373-0502

Website: http://www.deq.state.id.us

POTENTIAL CONTAMINANT INVENTORY LIST OF ACRONYMS AND DEFINITIONS

<u>AST (Aboveground Storage Tanks)</u> – Sites with aboveground storage tanks.

<u>Business Mailing List</u> – This list contains potential contaminant sites identified through a yellow pages database search of standard industry codes (SIC).

<u>CERCLIS</u> – This includes sites considered for listing under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA). CERCLA, more commonly known as ASuperfund≅ is designed to clean up hazardous waste sites that are on the national priority list (NPL).

<u>Cyanide Site</u> – DEQ permitted and known historical sites/facilities using cyanide.

<u>Dairy</u> – Sites included in the primary contaminant source inventory represent those facilities regulated by Idaho State Department of Agriculture (ISDA) and may range from a few head to several thousand head of milking cows.

<u>Deep Injection Well</u> – Injection wells regulated under the Idaho Department of Water Resources generally for the disposal of stormwater runoff or agricultural field drainage.

Enhanced Inventory – Enhanced inventory locations are potential contaminant source sites added by the water system. These can include new sites not captured during the primary contaminant inventory, or corrected locations for sites not properly located during the primary contaminant inventory. Enhanced inventory sites can also include miscellaneous sites added by the Idaho Department of Environmental Quality (IDEQ) during the primary contaminant inventory.

Floodplain – This is a coverage of the 100year floodplains.

<u>Group 1 Sites</u> – These are sites that show elevated levels of contaminants and are not within the priority one areas.

<u>Inorganic Priority Area</u> – Priority one areas where greater than 25% of the wells/springs show constituents higher than primary standards or other health standards.

<u>Landfill</u> – Areas of open and closed municipal and non-municipal landfills.

<u>LUST (Leaking Underground Storage Tank)</u> – Potential contaminant source sites associated with leaking underground storage tanks as regulated under RCRA.

<u>Mines and Quarries</u> – Mines and quarries permitted through the Idaho Department of Lands.)

Nitrate Priority Area – Area where greater than 25% of wells/springs show nitrate values above 5mg/l.

NPDES (National Pollutant Discharge Elimination System)

- Sites with NPDES permits. The Clean Water Act requires that any discharge of a pollutant to waters of the United States from a point source must be authorized by an NPDES permit.

<u>Organic Priority Areas</u> – These are any areas where greater than 25 % of wells/springs show levels greater than 1% of the primary standard or other health standards.

Recharge Point – This includes active, proposed, and possible recharge sites on the Snake River Plain.

RICRIS – Site regulated under **Resource Conservation Recovery Act (RCRA)**. RCRA is commonly associated with the cradle to grave management approach for generation, storage, and disposal of hazardous wastes.

SARA Tier II (Superfund Amendments and Reauthorization Act Tier II Facilities) – These sites store certain types and amounts of hazardous materials and must be identified under the Community Right to Know Act.

Toxic Release Inventory (TRI) – The toxic release inventory list was developed as part of the Emergency Planning and Community Right to Know (Community Right to Know) Act passed in 1986. The Community Right to Know Act requires the reporting of any release of a chemical found on the TRI list.

<u>UST (Underground Storage Tank)</u> – Potential contaminant source sites associated with underground storage tanks regulated as regulated under RCRA.

<u>Wastewater Land Applications Sites</u> – These are areas where the land application of municipal or industrial wastewater is permitted by IDEQ.

<u>Wellheads</u> – These are drinking water well locations regulated under the Safe Drinking Water Act. They are not treated as potential contaminant sources.

NOTE: Many of the potential contaminant sources were located using a geocoding program where mailing addresses are used to locate a facility. Field verification of potential contaminant sources is an important element of an enhanced inventory.

Where possible, a list of potential contaminant sites unable to be located with geocoding will be provided to water systems to determine if the potential contaminant sources are located within the source water assessment area.

References Cited

EPA (U.S. Environmental Protection Agency), 1997, State Methods for Delineating Source Water Protection Areas for Surface Water Supplied Sources of Drinking Water, EPA 816-R-97-008, 40p.

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U.S. Government Printing Office, 1995, Code of Federal Regulations, 40 CFR 112, Appendix C-III, Calculation of the Planning Distance

Attachment A

City of Weiser Susceptibility Analysis Worksheet The final scores for the susceptibility analysis were determined from the addition of the Potential Contaminant Source/Land Use Score and Source Construction Score.

Final Susceptibility Scoring:

- 0 7 Low Susceptibility
- 8 15 Moderate Susceptibility
- ∃ 16 High Susceptibility

Surface Water Susceptibility Report Public Water System Nu	WEISER CITY OF	Intake# :	SNAKE		2:53:36 PM
1. System Construction		SCORE			
Intake structure properly constructred	YES	0			
Infiltration gallery or well under the direct influence of Surface Water	NO	0			
	Total System Construction Score	2			
2. Potential Contaminant Source / Land Use		IOC Score	VOC Score	SOC Score	Microbial Score
Predominant land use type (land use or cover)	IRRIGATED CROPLAND	2	2	2	2
Farm chemical use high	NO	0	0	0	
Significant contaminant sources *	NO				
Sources of class II or III contaminants or microbials	present within the 500' of the intake and the	4	4	4	4
Agricultural lands within 500 feet	YES Greater than 50% Irrigated Agriculture	4	4	4	4
Three or more contaminant sources	YES	1	1	1	1
Sources of turbidity in the watershed	YES	1	1	1	1

3. Final Susceptibility Source Score

4. Final Sourcel Ranking

Total Potential Contaminant Source / Land Use Score 16 16 16 16 16

High High High High

^{*} Special consideration due to significant contaminant sources

The source water has no special susceptibility concerns

Surface Water Susceptibility Report	Public Water System Nu	WEISER CITY OF	Intake	Weiser R		8:31:16 AM
1. System Construction			SCORE			
Intake structure	e properly constructred	YES	0			
	tration gallery or well luence of Surface Water	NO	0			
		Total System Construction Score	2			
2. Potential Contaminant Source / Land T	Jse		IOC Score	VOC Score	SOC Score	Microbial Score
Predominant land use ty	ype (land use or cover)	IRRIGATED CROPLAND	2	2	2	2
	Farm chemical use high	NO	0	0	0	
Significant	contaminant sources *	NO				
Sources of class II or III cont	taminants or microbials	present within the 500' of the intake and the	4	4	4	4
Agricultural	l lands within 500 feet	YES Less than 25% Irrigated Agriculture	0	0	0	0
Three or mo	ore contaminant sources	YES	1	1	1	1
Sources of turk	pidity in the watershed	YES	1	1	1	1
	Tota	l Potential Contaminant Source / Land Use Score	12	12	12	12
3. Final Susceptibility Source Score			14	14	14	14
4. Final Sourcel Ranking			Moderate	Moderate	Moderate	Moderate

^{*} Special consideration due to significant contaminant sources
The source water has no special susceptibility concerns